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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/667,683

09/22/2003

Folkert W. Horst

U 014830-3

1545

7590

08/21/2006

Mr. William R. Evans
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EXAMINER

BANGACHON, WILLIAM L

ART UNIT

PAPER NUMBER

2612

DATE MAILED: 08/21/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/667,683

Applicant(s)

HORST ET AL.

Examiner

William L. Bangachon

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 22 September 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 14-21, 25, 29, 31, 33, 35, 37-41 and 43-49 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 14-21, 25, 29, 31, 33, 35, 37-41 and 43-49 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 22 September 2003 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Election/Restrictions

1. Applicant's election of Group II, claims 14-21, 25, 29, 31, 33, 35, 37-41 and 43-49 in the reply filed on 5/23/2006 is acknowledged. Because applicant did not distinctly and specifically point out the supposed errors in the restriction requirement, the election has been treated as an election without traverse (MPEP § 818.03(a)).

Examiner's Response

2. In response to applicant's election, the application has been examined. The Examiner has considered the presentation of claims in view of the disclosure and the present state of the prior art. It is the Examiner's position that claims 14-21, 25, 29, 31, 33, 35, 37 and 43-49 are unpatentable for the reasons set forth in this Office action:

Specification

3. Applicant is reminded of the proper language and format for an abstract of the disclosure.

The language should avoid using phrases which can be implied, such as, "The disclosure concerns," "The disclosure defined by this invention," "The disclosure describes," etc. In this case, the abstract recites the phrase "**The present invention**" in page 40, line 1.

Drawings

4. The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the "biometric sensor

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recited in claims 18, 33 (retina scanner) and 35 (DNA input)", the different types of "prompt" recited in claims 38-41, the "transmission termination event input" recited in claims 43-49, must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement-drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the Examiner does not accept the changes, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Double Patenting

5. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory

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obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

6. Claims 14, 25, 29, 31, 33, 35, 37 and 43 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1, 3-4, 11, 13-14, 20 and 22-23 of copending Application No. 10/667,641. Although the conflicting claims are not identical, they are not patentably distinct from each other because claims 14, 25, 29, 31, 33, 35, 37 and 43 are broader than the combination of claims 1 and 3-4 or 11 and 13-14 or 20 and 22-23, in the copending application.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Claim Rejections - 35 USC § 102

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

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(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claim Rejections - 35 USC § 103

8. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

9. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

10. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to

consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

11. Claims 14-21, 25, 29, 31, 33, 37, 39, 41 and 43-45 are rejected under 35 U.S.C. 102(e) as being anticipated by US Patent Publication 2004/02454410 {Kisak et al}.

In claim 14, Kisak et al teach of a remote control device (100) for controlling a locomotive (202), said remote control device comprising:

(a) a first input (e.g. reverser 118, throttle 120, AESS 122, communications interface 138) for receiving a command signal from a user, the command signal being indicative of a command to be executed by the locomotive (202) {paragraph [0027]};

(b) a second input (e.g. operator authorization input device 136) distinct from said first input, said second input being adapted for receiving user identification data {paragraph [0025]};

(c) a processing unit (102) operative to transmit a control signal indicative of a command to be executed by the locomotive when the user identification data belongs to an authorized user {paragraphs [0027], [0035]+}.

In claim 15, a remote control device as defined in claim 14, further comprising a user authentication unit (102) that is in communication with said second input (136), said user authentication unit (102) being adapted for:

(a) receiving the user identification data; and

(b) processing the user identification data to generate verification data indicative of whether the user identification data belongs to an authorized user {paragraphs [0027], [0035]+}.

In claim 16, said remote control device is adapted for storing data relating to command signals entered at said first input {paragraph [0027]}.

In claims 17-18, said user identification data includes a biometrics parameter (e.g. fingerprint, retina, voice) {paragraph [0025], lines 3-7}.

In claims 19-20, user identification data includes user-supplied information (e.g. User ID entered through a keyboard) {paragraph [0025], line 5+}.

In claim 21, said user-supplied information is stored on a computer readable storage medium (i.e. card), said second input (i.e. card reader 136) being adapted for reading said computer readable storage medium for extracting said user-supplied information {paragraph [0025], line 5+}.

Claim 25 recites the limitations of claim 14 and therefore rejected for the same reasons.

Claims 29 and 33 recites the combination of claims 15 and 18 and therefore rejected for the same reasons.

Claim 31 recites the limitations of claim 15 and therefore rejected for the same reasons.

Claim 37 recites the limitations of claim 14 further comprising:

(c) said remote control device being adapted to issue a prompt for indicating to a user to provide user identification data {paragraph [0024], lines 12-14+};

In claims 39 and 41, said prompt is a visual prompt through display device 126 such as a text message displayed to the user {paragraph [0024, lines 12-14+]}.

Claim 43 recites the limitations of claim 15 further comprising
in response to a transmission termination event (i.e. operator is not an authorized user), said processing unit being adapted to cease the transmission of control signals indicative of commands to be executed by the locomotive {paragraph [0032+], [0035-0036+], [0044]}.

In claim 44, said transmission termination event includes a termination signal from a central security control system 140 [paragraph [0031]].

In claim 45, said remote control device includes an input (136) for enabling a user to enter the termination signal. In this case, when the operator is immobilized and unable to control operation of the locomotive, remote control commands from a central security control system (140) is used to activate a dump valve and automatically engage air brakes {paragraph [0031]}.

12. Claims 35, 38 and 40 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent Publication 2004/02454410 {Kisak et al}.

Claim 35 recites the combination of claims 15 and 18. Kisak et al do not disclose "DNA information". However, these claim limitations are just a matter of obvious design choice in the system of Kisak et al and would have been obvious to include in the system of Kisak et al to one of ordinary skill in the art at the time of applicant's invention because these are an obvious variation of the biometric information of Kisak et al.

In claims 38 or 40, Kisak et al do not disclose said prompt is an audio prompt or a flashing light. However, these claim limitations are just a matter of obvious design choice in the system of Kisak et al and would have been obvious to include in the system of Kisak et al to one of ordinary skill in the art at the time of applicant's invention because an audio prompt or a flashing light are an obvious variation of the display prompt of Kisak et al.

13. Claims 46-49 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent Publication 2004/02454410 {Kisak et al} in view of US 2005/0039027 (Shapiro).

With regards to claims 46-47, Kisak et al do not disclose "said transmission termination event is the expiration of a time delay commencing upon receipt of a signal indicative of user identification data at said second input of said remote control device, wherein the user identification data is associated to an authorized user". Shapiro, an analogous art, is relied upon to teach of a biometrically authenticated (i.e. fingerprint (6), voice 10, others 12) device (32) (i.e. remote control device) shown in Figure 1, comprising a biometric authenticator (i.e. processor (4)) having a timing function (i.e. transmission termination event) such that the authentication obtained through the biometric sensor (6, 10, 12) only last a predetermined amount of time (i.e. time delay) {Shapiro, col. 3, paragraph [0019]}. Shapiro suggests that the timing function (i.e. transmission termination event) is advantageous because it "insures that the authorized individual is in possession of the remote control device substantially contemporaneously

with the authorization of the individual and the corresponding production of the authentication signal" {Shapiro, col. 3, paragraph [0019]}. It would have been obvious to one of ordinary skill in the art, at the time of applicant's invention, to include the transmission termination event (biometrically authorized timing function) of Shapiro in the system of Kisak et al because, as taught by Shapiro, the transmission termination event (biometrically authorized timing function) in the authenticator insures that the authorized individual (i.e. locomotive operator) is in possession of the remote control device substantially contemporaneously with the authorization of the individual and the corresponding production of the authentication signal.

In claim 48, Kisak et al do not disclose "said transmission termination event is the expiration of a time delay during which no signal indicative of a command to be executed by the locomotive is received at said first input of said remote control device." However, these claim limitations are just a matter of obvious design choice in the system of Shapiro because said termination event is an obvious variation of the timing function of Shapiro and would have been obvious in the system of Kisak et al, at the time of applicant's invention, because said transmission termination event insures that the authorized individual (i.e. locomotive operator) is in possession of the remote control device substantially contemporaneously with the authorization of the individual and the corresponding production of the authentication signal.

In claim 49, Kisak et al do not disclose "said processing unit is operative for resuming the transmission of control signals when new user identification data received at said second input subsequent to receipt of a transmission termination event, belongs

to an authorized user.” These claim limitations are inherent in the system of Shapiro. That is, since authentication obtained through the biometric sensor (6, 10, 12) only last a predetermined amount of time (i.e. time delay) {Shapiro, col. 3, paragraph [0019]}, said transmission termination event gets activated at the end of the predetermined amount of time, which requires new user identification/biometric data to be provided for the transmission of control signals to resume. Shapiro suggests that the timing function (i.e. transmission termination event) is advantageous because it “insures that the authorized individual is in possession of the remote control device substantially contemporaneously with the authorization of the individual and the corresponding production of the authentication signal” {Shapiro, col. 3, paragraph [0019]}. Therefore, it would have been obvious to one of ordinary skill in the art, at the time of applicant’s invention, to include the transmission termination event (biometrically authorized timing function) of Shapiro in the system of Kisak et al because, as taught by Shapiro, the transmission termination event (biometrically authorized timing function) in the authenticator insures that the authorized individual (i.e. locomotive operator) is in possession of the remote control device substantially contemporaneously with the authorization of the individual and the corresponding production of the authentication signal.

Office Contact Information

14. Any inquiry concerning this communication or earlier communications from the Examiner should be directed to William Bangachon whose telephone number is (571)-

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272-3065. The Examiner can normally be reached on Monday – Thursday, 8:30 AM – 4:30 PM.

If attempts to reach the Examiner by telephone are unsuccessful, the Examiner's supervisor, Wendy Garber can be reached on **(571)-272-7308**. The fax phone numbers for the organization where this application or proceeding is assigned is **571-273-8300** for regular and After Final formal communications. The Examiner's fax number is **(571)-273-3065** for informal communications.


Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at **866-217-9197** (toll-free).

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-305-4700.



William L. Bangachon
Examiner
Art Unit 2635

August 8, 2006



WENDY R. GARBER
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